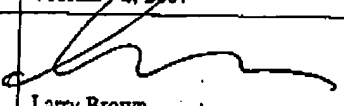


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UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANT(S) Jheroen P. Dorenbosch CONFIRMATION NO.: 6041
APPLN. NO.: 10/649,999 EXAMINER: Fox, Bryan J
FILED: August 26, 2003 GROUP ART UNIT: 2617
DOCKET NO. CE10990JI121
TITLE: SYSTEM AND METHOD TO IMPROVE WLAN AND OVER
BEHAVIOR AND PHONE BATTERY LIFE WHEN STATIONARY IN
BORDER CELLS

CERTIFICATE OF FAX TRANSMITTAL	
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Date:	February 2, 2007
Signature: Typed or Printed Name:	 Larry Brown

TRANSMITTAL LETTER FOR AMENDED BRIEF ON APPEAL

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Alexandria, VA 22313-1450

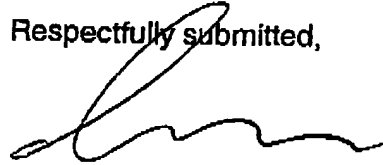
COPY

Sir:

Enclosed please find one copy of an Amended Appeal Brief filed on behalf of the applicants in the matter of the above entitled application. This Amended Brief is filed pursuant to 37 CFR § 41.37(d) following the Notification of Non-Compliant Appeal Brief of October 2, 2006.

The Commissioner is authorized to charge any requisite fees for filing the enclosed Amended Brief to Motorola, Inc., Deposit Account No. 502117. Any overpayment should be credit to the same Deposit Account.

Respectfully submitted,



SEND CORRESPONDENCE TO:

Motorola, Inc.

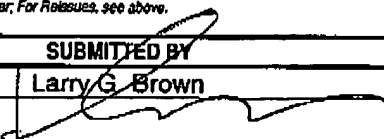
Customer Number: 24273

By: Larry G. Brown
Attorney of Record
Reg. No. 45,834
Telephone: (954) 723-4295
Fax No.: (954) 723-3871

COPY

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FEE TRANSMITTAL Patent fees are subject to annual revision <input type="checkbox"/> Applicant claims small entity status. See 37 CFR 1.27		Complete if Known	
		Application Number	10/649,999
		Filing Date	August 26, 2003
		First Named Inventor	Jheroen P. Dorenbosch
		Examiner Name	Fox, Bryan J
TOTAL AMOUNT OF PAYMENT		(\$1,020.00)	
Group Art Unit		2617	
Attorney Docket No.		CE10990JI121	

METHOD OF PAYMENT (check all that apply)		FEE CALCULATION (continued)																																																																																								
<input type="checkbox"/> Check <input type="checkbox"/> Credit card <input type="checkbox"/> Money Order <input type="checkbox"/> Other <input type="checkbox"/> None <input checked="" type="checkbox"/> Deposit Account: Deposit Account Number: 502117 Deposit Account Name: Motorola, Inc.		3. ADDITIONAL FEES <table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>Large Entity</th> <th>Small Entity</th> <th>Fee Description</th> </tr> </thead> <tbody> <tr><td>1051</td><td>2051</td><td>Surcharge - late filing fee or oath</td></tr> <tr><td>1052</td><td>2052</td><td>Surcharge - late Provisional filing</td></tr> <tr><td>1053</td><td>1053</td><td>Non-English specification</td></tr> <tr><td>1812</td><td>2620</td><td>For filing a request for ex parte Reexamination</td></tr> <tr><td>1804</td><td>920*</td><td>Requesting publication of SI prior to Examiner action</td></tr> <tr><td>1805</td><td>1840*</td><td>Requesting publication of SIR after Examiner action</td></tr> <tr><td>1251</td><td>110</td><td>Extension for reply within first month</td></tr> <tr><td>1252</td><td>430</td><td>Extension for reply within second month</td></tr> <tr><td>1253</td><td>980</td><td>Extension for reply within third month</td></tr> <tr><td>1254</td><td>1530</td><td>Extension for reply within fourth month</td></tr> <tr><td>1255</td><td>2080</td><td>Extension for reply within fifth month</td></tr> <tr><td>1401</td><td>340</td><td>Notice of Appeal</td></tr> <tr><td>1402</td><td>340</td><td>Filing a brief in support of an appeal</td></tr> <tr><td>1403</td><td>300</td><td>Request for oral hearing</td></tr> <tr><td>1451</td><td>1510</td><td>Petition to institute a public use proceeding</td></tr> <tr><td>1452</td><td>110</td><td>Petition to revive - unavoidable</td></tr> <tr><td>1453</td><td>1370</td><td>Petition to revive - unintentional</td></tr> <tr><td>1501</td><td>1370</td><td>Utility issue fee (or reissue)</td></tr> <tr><td>1502</td><td>490</td><td>Design issue fee</td></tr> <tr><td>1503</td><td>650</td><td>Plant issue fee</td></tr> <tr><td>1460</td><td>130</td><td>Petitions to the Commissioner</td></tr> <tr><td>1807</td><td>50</td><td>Processing fee under 37 CFR 1.17(a)</td></tr> <tr><td>1808</td><td>180</td><td>Submission of IDS</td></tr> <tr><td>8021</td><td>40</td><td>Recording each patent assignment</td></tr> <tr><td>1809</td><td>790</td><td>Filing a submission after final rejection (37 CFR § 1.129(a))</td></tr> <tr><td>1810</td><td>790</td><td>For each additional invention to be examined (37 CFR § 1.129(b))</td></tr> <tr><td>1801</td><td>790</td><td>Request for Continued Examination (RCE)</td></tr> <tr><td>1802</td><td>900</td><td>Request for expedited examination of a design application</td></tr> </tbody> </table>		Large Entity	Small Entity	Fee Description	1051	2051	Surcharge - late filing fee or oath	1052	2052	Surcharge - late Provisional filing	1053	1053	Non-English specification	1812	2620	For filing a request for ex parte Reexamination	1804	920*	Requesting publication of SI prior to Examiner action	1805	1840*	Requesting publication of SIR after Examiner action	1251	110	Extension for reply within first month	1252	430	Extension for reply within second month	1253	980	Extension for reply within third month	1254	1530	Extension for reply within fourth month	1255	2080	Extension for reply within fifth month	1401	340	Notice of Appeal	1402	340	Filing a brief in support of an appeal	1403	300	Request for oral hearing	1451	1510	Petition to institute a public use proceeding	1452	110	Petition to revive - unavoidable	1453	1370	Petition to revive - unintentional	1501	1370	Utility issue fee (or reissue)	1502	490	Design issue fee	1503	650	Plant issue fee	1460	130	Petitions to the Commissioner	1807	50	Processing fee under 37 CFR 1.17(a)	1808	180	Submission of IDS	8021	40	Recording each patent assignment	1809	790	Filing a submission after final rejection (37 CFR § 1.129(a))	1810	790	For each additional invention to be examined (37 CFR § 1.129(b))	1801	790	Request for Continued Examination (RCE)	1802	900	Request for expedited examination of a design application
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3. SUBMITTED BY Name (Print/Type): Larry G. Brown Signature: 		Complete (if applicable) Registration No.: 45,834 Telephone: 954-723-4285 Date: February 2, 2007																																																																																								

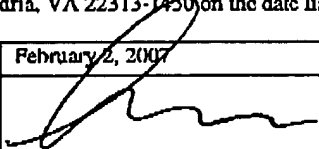
Application No. 10/649,999
Amended Appeal Brief dated February 2, 2007

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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE
BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES **FEB 02 2007**

APPLICANT: Jheroen P. Dorenbosch ART UNIT: 2617
APPLN. NO.: 10/649,999 EXAMINER: Fox, Bryan J
FILED: August 26, 2003
TITLE: SYSTEM AND METHOD TO IMPROVE WLAN AND OVER
BEHAVIOR AND PHONE BATTERY LIFE WHEN STATIONARY IN
BORDER CELLS

CERTIFICATE OF FAX TRANSMITTAL	
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Date:	February 2, 2007
Signature: Typed or Printed Name:	 Larry G. Brown

AMENDED APPEAL BRIEF

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Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Attention: Board of Patent Appeals and Interferences

Dear Chief Administrative Patent Judge:

Application No. 10/649,999
Amended Appeal Brief dated February 2, 2007

CE10990J1121

This Amended Appeal Brief addresses the Notice of Non-Compliant Appeal Brief dated October 2, 2006. A Three-Month Extension of Time Request is attached to this Amended Appeal Brief.

Although Applicant believes that no fees are required for filing this Amended Appeal Brief (other than for the Extension of Time), the Commissioner is authorized to charge such fees where necessary.

This brief is being transmitted by facsimile pursuant to 37 C.F.R. § 1.6(d).

This brief contains items under the headings listed in the following Table of Contents.

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I. REAL PARTY IN INTEREST

The real party of interest is Motorola, Inc., a Delaware corporation.

II. RELATED APPEALS AND INTERFERENCES

There are no related appeals or interferences.

III. STATUS OF CLAIMS

This is an appeal from the final rejection of claims 1-23 and 25-30 of the above-referenced application. Claim 24 was previously canceled without prejudice and as such, is not on appeal here.

A. TOTAL NUMBER OF CLAIMS IN APPLICATION

There are a total of 29 claims in the application.

B. STATUS OF ALL THE CLAIMS

1. Claims allowed: none
2. Claims objected to: none
3. Claims rejected: 1-23 and 25-30
4. Claims canceled: 24

C. CLAIMS ON APPEAL

The claims on appeal are: 1-23 and 25-30. Claim 24 is not on appeal.

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IV. STATUS OF AMENDMENTS

A Final Rejection was mailed on February 9, 2006 in response to an Amendment filed on November 7, 2005. The Amendment and arguments were considered by the Examiner but were deemed unpersuasive and moot in view of new grounds of rejection. Applicants faxed a Notice of Appeal on May 25, 2006. A Notification of Non-Compliant Appeal Brief was mailed on October 2, 2006. No amendments have been filed subsequent to the Final Rejection.

V. SUMMARY OF THE CLAIMED SUBJECT MATTER

Although specification citations are inserted below in accordance with C.F.R. 41.37, these reference numerals and citations are merely examples of where support may be found in the specification for the terms used in this section of the brief. There is no intention to in any way suggest that the terms of the claims are limited to the examples in the specification. Although, as demonstrated by the reference numerals and citations below, the claims are fully supported by the specification as required by law, it is improper under the law to read limitations from the specification into the claims. Pointing out specification support for the claim terminology, as is done here to comply with rule 41.37, does not in any way limit the scope of the claims to those examples from which they find support. Nor does this exercise provide a mechanism for circumventing the law precluding reading limitations into the claims from the specification. In short, the reference numerals

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and specification citations are not to be construed as claim limitations or in any way used to limit the scope of the claims.

The claimed subject matter of independent claim 1 pertains to a method (700, 800, 900, 1000, 1100) that can improve handover between different communications systems. The method (700, 800, 900, 1000, 1100) includes the steps of determining that a wireless device (306) operating in a first wireless communication system is detecting (steps 702, 802, 902, 1006, 1102) a triggering event and initiating (steps 704, 804, 904, 1108) a registration sequence with a second wireless communication system in response to determining that the wireless device (306) is detecting the triggering event (see FIGs. 7-11 and page 4, line 18 to page 5, line 2). The method (700, 800, 900, 1000, 1100) also includes the step of conducting (steps 710, 814, 916, 1116) a current call or a subsequent call via the second wireless communication system in response to determining that a speed or displacement of the wireless device (306) exceeds a first predetermined threshold (see FIGs. 7-11 and page 5, lines 2-5). The method (700, 800, 900, 1000, 1100) further includes the step of aborting (steps 810, 910, 1114) the registration sequence in response to determining that a speed or displacement of the wireless device (306) does not exceed a second predetermined threshold (see FIGs. 8, 9 and 11 and page 5, lines 7-9).

The claimed subject matter of independent claim 14 pertains to a method

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(700, 800, 900, 1000, 1100) that can improve handover between different communications systems. The method (700, 800, 900, 1000, 1100) includes the steps of determining that a wireless device (306) operating in a first wireless communication system is detecting (steps 702, 802, 902, 1006, 1102) a triggering event and initiating (steps 704, 804, 904, 1108) a registration sequence with a second wireless communication system in response to determining that the wireless device (306) is detecting (steps 702, 802, 902, 1006, 1102) a triggering event (see FIGs. 7-11 and page 4, line 18 to page 5, line 2). The method (700, 800, 900, 1000, 1100) further includes the step of measuring (steps 708, 806, 906, 1106) a speed or displacement of the wireless device (306) exceeding a first predetermined threshold (see FIGs. 7-11 and page 5, lines 2-5). The method (700, 800, 900, 1000, 1100) also includes the steps of conducting (steps 710, 814, 916, 1116) current and subsequent calls via the second wireless communication system (see FIGs. 7-11 and page 5, lines 2-5).

The claimed subject matter of independent claim 18 pertains to a mobile communication device (306). The device (306) includes at least two transceivers (404, 410), each transceiver (404, 410) designed to operate on a separate wireless communications system, for transmitting and receiving wireless information (see FIG. 4 and page 9, lines 20-24). The device (306) also includes a controller (418), communicatively coupled to each transceiver (404, 410), for managing the

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operation of the mobile device (306) (see FIG. 4 and page 10, lines 4-6). The device (306) can further have a first wireless communications system stack (510), communicatively coupled to the controller (418), that has instructions for communicating according to its respective protocol and a second wireless communications system stack (508), communicatively coupled to the controller (418), that has instructions for communicating according to its respective protocol (see FIG. 5 and page 10, lines 8-16). The device (306) also has means (314) for measuring speed or displacement of the device (306), which is communicatively coupled to the controller (418) (see FIG. 4 and page 9, lines 12-13).

The device (306) also has a handover manager (514) that is communicatively coupled to the controller (418), the first wireless communications system stack (510), the second wireless communications system stack (508) and the means (314) for measuring speed or displacement of the device (306) (see FIGs. 4 and 5). The handover manager (514) determines when to handover from the first wireless system to the second wireless system in response to determining that a speed or displacement of the device (306) exceeds a first predetermined threshold (see page 14, line 19 to page 15, line 9). In addition, the handover manager (514) aborts a registration sequence with the second wireless communications system in response to determining that a speed or displacement of the wireless device (306) does not exceed a second predetermined threshold (see

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page 16, lines 8-13).

The claimed subject matter of independent claim 21 pertains to a mobile communication system. The system includes at least one cell (104) of a wireless local area network (WLAN) communications system in which the cell (104) provides communication coverage within a structure (108) having at least one egress point (212) and at least one coverage cell (102) of a second communications system, overlapping the cell of the WLAN, for providing communication coverage outside the structure (108) (see FIG. 3 and page 9, lines 8-10). The system also includes at least one border cell (210) of a WLAN communications system in which the border cell (210) is located at the egress point (212) of the structure (108), providing a transition area from the WLAN communications system and the second communications system (see FIG. 3 and page 3, line 17 to page 4, line 2).

The system also includes at least one mobile subscriber device (306) that is communicatively coupled with the cell (104) of the WLAN communications system, the coverage cell (102) of the second communications system, and the border cell (210) of the WLAN communications system (see FIG. 3 and page 9, lines 2-6). The mobile device (306) determines when to handover from one wireless communication system to the second wireless communication system in response to determining that a speed or displacement of the device (306) exceeds a predetermined threshold (see page 14, line 19 to page 15, line 9). Moreover, the

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handover manager (514) aborts a registration sequence with the second wireless communication system in response to determining that a speed or displacement of the wireless device (306) does not exceed a second predetermined threshold (see page 16, lines 8-13).

The claimed subject matter of independent claim 22 pertains to a computer readable medium that contains computer instructions for performing steps. The steps include determining that a wireless device (306) operating in a first wireless communication system is detecting (steps 702, 802, 902, 1006, 1102) a triggering event and initiating (steps 704, 804, 904, 1108) a registration sequence with a second wireless communication system in response to determining that the wireless device (306) is detecting the triggering event (see FIGs. 7-11 and page 4, line 18 to page 5, line 2). The steps also include conducting (steps 710, 814, 916, 1116) current and subsequent calls via the second wireless communication system in response to determining that a speed or displacement of the wireless device (306) exceeds a first predetermined threshold and aborting (steps 810, 910, 1114) the registration sequence in response to determining that a speed or displacement of the wireless device (306) does not exceed a second predetermined threshold (see FIGs. 7-11 and page 5, lines 2-9).

The claimed subject matter of independent claim 28 pertains to a method to improve battery life of a wireless device (306). The method (700, 800, 900, 1000,

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1100) includes the steps of conducting a current call via a first wireless communication system, detecting (steps 702, 802, 902, 1006, 1102) a triggering event at the wireless device (306), measuring (steps 708, 806, 906, 1106) a speed or a displacement of the wireless device (306) and initiating (steps 704, 804, 904, 1108), while conducting the current call via the first wireless communication system, a registration sequence with a second wireless communication system in response to detecting a triggering event at the wireless device (306) (see FIGs. 7-11 and page 4, line 18 to page 5, line 2). The method (700, 800, 900, 1000, 1100) also includes the steps of conducting (steps 710, 814, 916, 1116) the current call or a subsequent call via the second wireless communication system in response to determining that the speed or the displacement of the wireless device (306) exceeds a first predetermined threshold and conducting (steps 810, 910) the current call or a subsequent call via the first wireless communication system in response to determining that the speed or the displacement of the wireless device does not exceed the first predetermined threshold (see page 15, lines 7-13).

VI. GROUNDS OF REJECTION TO BE REVIEWED ON APPEAL

Whether claims 1, 9-11, 14, 16, 17, 22 and 28 are patentable under 35 U.S.C. 102(e) over U.S. Patent No. 6,714,785 to Han (Han).

Whether claims 2-8, 12, 15, 21, 23, 25-27 and 29 are patentable under 35 U.S.C. 103(a) over Han in view of U.S. Patent Application Publication No.

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2004/0203789 to Hammond, et al. (Hammond).

Whether claims 18-20 are patentable under 35 U.S.C. 103(a) over Han in view of Hammond and further in view of Applicant's admission of prior art.

Whether claim 13 is patentable under 35 U.S.C. 103(a) over Han in view of Hammond and further in view of U.S. Patent Application Publication No. 2003/0109258 to Mantyjarvi, et al. (Mantyjarvi).

Whether claim 30 is patentable under 35 U.S.C. 103(a) over Han in view of Hammond and further in view of U.S. Patent No. 6,771,963 to Cheng, et al. (Cheng).

VII. ARGUMENT

A. The recitations of Han do not render the invention of claims 1, 9-11, 14, 16, 17, 22 and 28 unpatentable.

A brief summary of the Han reference may be helpful here. Han describes a device for performing a handoff between the cells of a mobile communication system (see Abstract, FIG. 1 and col. 1, lines 35-36). In particular, a mobile station that is in a call (111) transmits a handoff request message including a measured signal power value and information about a traveling direction thereof, when signal power from an adjacent base station (BS2) is higher than a predetermined threshold (see col. 3, lines 13-19). Upon detection of the handoff request, a service base station (BS1) examines traffic resources of the adjacent base station (BS2)

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through a base station controller (131) to determine whether there are sufficient spare channels (see col. 8, line 66 to col. 9, line 2). When it is determined that there are sufficient spare channels, the service base station (BS2) performs a handoff (see col. 9, lines 2-5). The handover is between the serving base station (BS1) and the adjacent base station (BS2) (see col. 4, lines 27-39). As taught by Han, these base stations belong to the same mobile communication system (see col. 1, lines 35-36). That is, Han does not describe a procedure for transferring a wireless device between a first communication system and a different second communication system.

It is well settled that in order for a claim to be anticipated under 35 U.S.C. § 102, each and every element of the claimed invention must be disclosed in a single prior art reference. Orthokinetics, Inc. v. Safety Travel Chairs, Inc., 806 F.2d 1565, 1574 (Fed. Cir. 1986). Whether the reference discloses every element of the invention, and also whether the reference and the claimed invention are the same, is to be determined by considering how persons of ordinary skill in the art interpret the reference. Scripps Clink & Research Fdm. v. Genentech, Inc., 927 F.2d 1565, 1576 (Fed. Cir. 1991).

Additionally, the best defense against hind-sight based obviousness analysis is the rigorous application of the requirement for a showing of a teaching, or motivation to combine the prior art references. Ecolochem v. Southern California

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Edison Co., 227 F.3d 1361, 1371 (Fed. Cir. 2000). "Combining prior art references without evidence of such a suggestion, teaching or motivation simply takes the inventor's disclosure as a blueprint for piecing together the prior art to defeat patentability--the essence of hindsight." Id. at 1371-1372.

Independent claims 1, 14, 22 and 28 include the feature that a registration sequence is initiated with a second wireless communication system in response to determining that the wireless device is detecting a triggering event. Also, claims 1 and 22 and dependent claim 16 include the feature that the registration sequence is aborted in response to determining that a speed or displacement of the wireless device does not exceed a second predetermined threshold.

It is well known that a handoff from one cell of a system to another cell of the same system is done without initiating a registration sequence with that system. As such, because Han is merely concerned with handover between cells of the same communications system, Han clearly does not disclose the concept of initiating a registration sequence and more specifically, initiating a registration sequence with a second wireless system or aborting the registration with the second wireless system, particularly based on speed or displacement measurements of the wireless device.

The Examiner has attempted to equate the intra-system handover process described in Han with switching between different network systems, as recited in

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the claims of the present invention. There are several reasons why this contention is inaccurate. In particular, as noted above, interpretation of the prior art reference must be done through the eyes of one of ordinary skill in the art. Han expressly notes that the communication system being described is a CDMA system (see col. 4, lines 48-50). Under the Third Generation Partnership Project 2 (3GPP2), an organization comprised of North American and Asian interests that sets global specifications for third generation telecommunications systems, descriptions of the registration of a handset and the handoff of a handset are provided.

For example, under Section 2.6.5.1 of the Upper Layer (Layer 3) Signaling Standard for CDMA2000 Spread Spectrum Systems, Release D, Version 2.0 ("Standard"), a copy of which was attached to Applicants' original Appeal Brief of May 25, 2006, the term registration is explained as a "process by which the mobile station notifies the base station of its location, status, identification, slot cycle and other characteristics. The mobile station informs the base station of its location and status so that the base station can efficiently page the mobile station when establishing a mobile station terminated call." (see page 2-487, lines 3-6). The registration procedures themselves are outlined in Section 2.6.5.5 of the Standard (see pages 2-498 – 2-510), a copy of which was attached in Applicants' original Appeal Brief.

In Section 2.6.6 of that same Standard, a copy of which was also attached in

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the original Appeal Brief, it is noted that "[t]his section presents an overview and mobile station requirements for handoffs occurring while the mobile station is in the *Mobile Station Control on the Traffic Channel State . . .*" (see page 2-510, lines 8-10). Under Section 2.6.4, a copy of which is attached, in the Mobile Station Control on the Traffic Channel State, "the mobile station communicates with the base station using the Forward and Reverse Traffic Channels." (see page 2-340, lines 33-34). In Section 2.6.6.1.1, a copy of which was attached in the original Appeal Brief, several examples of handoff procedures are described, including hard and soft handoffs (see page 2-510, lines 13-31).

Clearly, individuals skilled in the area of mobile telecommunications have recognized a difference between registration and handoff procedures in view of promulgating standards for both of them. This is true for CDMA, as well as for other cellular standards, like GSM. Further, the handoff procedures of the Standard are described in terms of the mobile station already having established a session via the base station, which will not occur unless the mobile station has previously *registered* with the base station. As such, there is ample evidence that one of skill in the art would interpret the phrase "initiating a registration sequence with a second wireless communication system" as a process where a mobile unit first communicates with a second communication system that is different from the one with which it is currently communicating to begin operation in the second

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communication system. Moreover, in view of the above, one of skill in the art would also interpret the phrase "aborting the registration sequence" as a process of terminating the attempt to establish operations via the different network.

A careful review of Han shows that it is directed to and only concerns handoff procedures within a single CDMA communication system, as no reference is made to different communication networks anywhere within Han (see, e.g., FIG. 1; the Abstract; col. 3, lines 13-14; col. 3, lines 30-31; and col. 8, line 40 to col. 9, line 5). In fact, Han expressly describes both soft and hard handoffs, further solidifying its link with the above Standard (see col. 1, lines 19-33). As further evidence that Han is limited to handoff procedures within the same network, the mobile device (111) of Han is never described as a dual-mode device that contains different transceivers for different networks, as is done with the current invention. In view of the above, Applicants submit that one of skill in the art would not believe that Han reads on the invention as claimed.

B. The recitations of Han and Hammond do not render the invention of claims 2-8, 12, 15, 21, 23, 25-27 and 29 unpatentable.

Independent claim 21 recites the feature that the mobile subscriber device determines when to handover from one wireless communication system to a second wireless communication system and that the handover manager aborts a registration sequence with the second wireless communication system. For

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reasons previously explained, Applicants submit that Han does not describe handover between first and second communication networks or the selective termination of a registration sequence with the second system.

Independent claim 21 also recites the feature that the mobile communication system includes at least one border cell of a WLAN communications system located at an egress point of a structure. As described in the specification of the current application, a border cell is a WLAN cell that includes an access point that transmits information to a mobile unit that identifies the WLAN cell as a border cell (see page 3, lines 18-22). That is, a mobile unit may rely on the actual identification of a border cell to determine that it is near an entry/exit point, as opposed to constantly monitoring the signal strength of a WLAN cell. Hammond simply does not show, describe or even suggest the concept of border cells, as understood by one of skill in the art.

C. The recitations of Han, Hammond and Applicants' admission of prior art do not render the invention of claims 18-20 unpatentable.

Independent claim 18 recites the features that the mobile communication device includes at least two transceivers and the handover manager determines when to handover from the first wireless communication system to the second wireless communication system. Claim 18 also recites that the handover manager aborts a registration sequence with the second wireless communication system. As

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previously explained, Han does not show, describe or suggest such concepts, as Han is merely concerned with handoffs within a single CDMA wireless system. Thus, Applicants submit that Han does not show a handover manager that determines when to switch communications from a first wireless network to a different second wireless network and selectively aborts the process.

Applicants also submit that there is no suggestion or motivation to combine the GPRS and WLAN transceivers of Hammond with Han. Notably, Han only describes a handoff procedure within a single wireless CDMA system, and as such, one of skill in the art would find no reason to implement the two transceivers of Hammond with Han. In fact, Applicants contend that Han teaches away from such a combination. Specifically, Han explains that "an important role of a searcher is to acquire PN codes generated from the base stations in a cell where the mobile stations are located, and search a PN code generated from an adjacent base station to perform a handoff. In the present embodiment, estimation of the location and traveling direction of the mobile station is obtained as a by-product of searching PN codes of adjacent base stations when performing a handoff." (see col. 4, lines 40-47). As a result, for the invention of Han to work, the base stations must be within the same network, as the differences between base stations of separate networks would interfere with the estimation of the location and traveling direction of the mobile station. Indeed, synchronization is paramount in Han, as Han

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specifies that the PN generator is for distinguishing between base stations in a *synchronous* CDMA system (see col. 4, lines 48-50), something not present between different networks.

D. The recitations of Han, Hammond and Mantyjarvi do not render the invention of claim 13 unpatentable.

Applicants submit that the invention of claim 13 is patentable in view of the arguments presented above in section A.

E. The recitations of Han, Hammond and Cheng do not render the invention of claim 30 unpatentable.

Dependent claim 30 recites the feature that the triggering event is a detection of a wireless local area network border cell, and the border cell provides information to the wireless device that identifies the cell as a border cell. In view of the above, Applicants do not believe that Cheng describes such an element. In particular, the handoff trigger in Cheng is based on a signal level, not the identification of a border cell (see col. 3, lines 23-27 – “A handdown or a handoff of the mobile station is triggered after deriving the received power level of the control signal at the mobile station, and determining that the received power level is less than the receive power level.”).

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Conclusion

For the claims to be unpatentable under § 102, each and every element of the claimed invention must be disclosed in a single prior art reference. Moreover, for claims to be unpatentable under § 103, there must be some suggestion or motivation to combine the prior art references, and the combination of references must show each and every element. Because every element of the claimed invention is not disclosed by the prior art and because there is no suggestion to combine the Han and Hammond references, Applicants contend that the claims on appeal are patentable.

For the reasons set forth above, and as is apparent from a review of the above-cited references, the claims on appeal present patentable subject matter such that reversal of the rejection is appropriate.

Respectfully submitted,

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VIII. CLAIMS APPENDIX

1. (previously presented) A method comprising:

determining that a wireless device operating in a first wireless communication system is detecting a triggering event;

initiating a registration sequence with a second wireless communication system in response to determining that the wireless device is detecting the triggering event;

conducting a current call or a subsequent call via the second wireless communication system in response to determining that a speed or displacement of the wireless device exceeds a first predetermined threshold; and

aborting the registration sequence in response to determining that a speed or displacement of the wireless device does not exceed a second predetermined threshold.
2. (previously presented) The method of claim 1, wherein the triggering event is a detection of a wireless local area network border cell or a detection of a degradation of signal quality.
3. (previously presented) The method of claim 1, wherein the first wireless communication system is a wireless local area network (WLAN) and the second

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wireless communication system is a wide area network (WAN).

4. (previously presented) The method of claim 3, wherein the wireless local area network (WLAN) uses a protocol of IEEE Standard 802.11 or Bluetooth.

5. (previously presented) The method of claim 3, wherein the wide area network (WAN) uses a protocol of code division multiple access (CDMA), time division multiple access (TDMA), global system for mobile communications (GSM) or integrated digital enhanced network (iDEN).

6. (previously presented) The method of claim 1, wherein the first wireless communication system is a wide area network (WAN) and the second wireless communication system is a wireless local area network (WLAN).

7. (previously presented) The method of claim 6, wherein the wireless local area network (WLAN) uses a protocol of IEEE Standard 802.11 or Bluetooth.

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8. (previously presented) The method of claim 6, wherein the wide area network (WAN) uses a protocol of code division multiple access (CDMA), time division multiple access (TDMA), global system for mobile communications (GSM) or integrated digital enhanced network (iDEN).

9. (previously presented) The method of claim 1, wherein the determining, initiating, conducting and aborting steps are performed in the wireless device, wherein the wireless device is a mobile subscriber unit.

10. (previously presented) The method of claim 1, wherein aborting the registration sequence comprises, if the registration sequence is complete, deregistering from the second wireless communication system in response to determining that a speed or displacement of the wireless device does not exceed the second predetermined threshold.

11. (previously presented) The method of claim 1, wherein the speed or displacement of the wireless device step is determined by movement detecting means of the wireless device.

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12. (previously presented) The method of claim 11, wherein the movement detecting means comprises an accelerometer detecting means or a global positioning system means.

13. (original) The method of claim 12, wherein the accelerometer detecting means comprises at least three independent axes.

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14. (previously presented) A method comprising:
- determining that a wireless device operating in a first wireless communication system is detecting a triggering event;
 - initiating a registration sequence with a second wireless communication system in response to determining that the wireless device is detecting a triggering event and measuring a speed or displacement of the wireless device exceeding a first predetermined threshold; and
 - conducting current and subsequent calls via the second wireless communication system.
15. (previously presented) The method of claim 14, wherein the triggering event is a detection of a wireless local area network border cell or a detection of a degradation of signal quality.
16. (previously presented) The method of claim 14, further comprising:
- aborting the registration sequence in response to determining that a speed or displacement of the wireless device does not exceed a second predetermined threshold, wherein the determining, initiating, conducting and aborting steps are performed in the wireless device, wherein the wireless device is a mobile subscriber unit.

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17. (previously presented) The method of claim 14, further comprising:

if the registration sequence is completed, deregistering from the second wireless communication system in response to determining that a speed or displacement of the wireless device does not exceed a second predetermined threshold.

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18. (previously presented) A mobile communication device comprising:
- at least two transceivers, each transceiver designed to operate on a separate wireless communications system, for transmitting and receiving wireless information;
 - a controller, communicatively coupled to each transceiver, for managing the operation of the mobile communication device;
 - a first wireless communications system stack, communicatively coupled to the controller, having instructions for communicating according to its respective protocol;
 - a second wireless communications system stack, communicatively coupled to the controller, having instructions for communicating according to its respective protocol;
 - a means for measuring speed or displacement of the wireless device, communicatively coupled to the controller; and
 - a handover manager, communicatively coupled to the controller, the first wireless communications system stack, the second wireless communications system stack, and the means for measuring speed or displacement of the wireless device, the handover manager for determining when to handover from the first wireless communication system to the second wireless communication system in response to determining that a speed or displacement of the device exceeds a first

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predetermined threshold, wherein the handover manager aborts a registration sequence with the second wireless communication system in response to determining that a speed or displacement of the wireless device does not exceed a second predetermined threshold.

19. (previously presented) The device of claim 18, wherein the means for measuring speed or displacement of the device comprises an accelerometer detecting means or a global positioning system detecting means.

20. (previously presented) The device of claim 18, wherein the handover manager, if a registration sequence with the second wireless communication system is completed, deregisters the wireless device from the second wireless communication system in response to determining that a speed or displacement of the wireless device does not exceed the second predetermined threshold.

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21. (previously presented) A mobile communication system comprising:

at least one cell of a wireless local area network communications system, the at least one cell providing communication coverage within a structure having at least one egress point;

at least one coverage cell of a second communications system, overlapping the at least one cell of a wireless local area network, for providing communication coverage outside the structure;

at least one border cell of a wireless local area network communications system, the border cell located at the egress point of the structure, providing a transition area from the wireless local area network communications system and the second communications system; and

at least one mobile subscriber device, communicatively coupled with the at least one cell of the wireless local area network communications system, the at least one coverage cell of the second communications system, and the at least one border cell of a wireless local area network communications system, the at least one mobile subscriber device determining when to handover from one wireless communication system to the second wireless communication system in response to determining that a speed or displacement of the device exceeds a predetermined threshold, wherein the handover manager aborts a registration sequence with the second wireless communication system in response to determining that a speed or

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displacement of the wireless device does not exceed a second predetermined threshold.

22. (previously presented) A computer readable medium comprising computer instructions for performing the steps of:

determining that a wireless device operating in a first wireless communication system is detecting a triggering event;

initiating a registration sequence with a second wireless communication system in response to determining that the wireless device is detecting the triggering event;

conducting current and subsequent calls via the second wireless communication system in response to determining that a speed or displacement of the wireless device exceeds a first predetermined threshold; and

aborting the registration sequence in response to determining that a speed or displacement of the wireless device does not exceed a second predetermined threshold.

23. (previously presented) The computer readable medium of claim 22, wherein the triggering event is a detection of a wireless local area network border cell or a detection of a degradation of signal quality.

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24. (canceled)

25. (previously presented) The computer readable medium of claim 22, wherein aborting the registration sequence comprises, if the registration sequence is complete, deregistering from the second wireless communication system in response to determining that a speed or displacement of the wireless device does not exceed the second predetermined threshold.

26. (previously presented) The computer readable medium of claim 22, wherein the speed or displacement of the wireless device is determined by movement detecting means of the wireless device.

27. (previously presented) The computer readable medium of claim 26, wherein the movement detecting means comprises an accelerometer detecting means or a global positioning system means.

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28. (previously presented) A method to improve battery life of a wireless device, comprising:

conducting a current call via a first wireless communication system;

detecting a triggering event at the wireless device;

measuring a speed or a displacement of the wireless device;

initiating, while conducting the current call via the first wireless communication system, a registration sequence with a second wireless communication system in response to detecting a triggering event at the wireless device;

conducting the current call or a subsequent calls via the second wireless communication system in response to determining that the speed or the displacement of the wireless device exceeds a first predetermined threshold; and

conducting the current call or a subsequent call via the first wireless communication system in response to determining that the speed or the displacement of the wireless device does not exceed the first predetermined threshold.

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29. (previously presented) The method of claim 28, further comprising:
determining again a speed or a displacement of the wireless device; and
deregistering from the second wireless communication system in response
to determining that the again determined speed or displacement of the wireless
device does not exceed a second predetermined threshold.

30. (previously presented) The method of claim 28, wherein the triggering event
is a detection of a wireless local area network border cell, the border cell providing
information to the wireless device that identifies the cell as a border cell.

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IX. EVIDENCE APPENDIX

None

X. RELATED PROCEEDINGS APPENDIX

None